

CITY OF MANCHESTER  
EDUCATION COMMITTEE

Annual Report  
of  
The Acting School Medical Officer  
Dr. J. GILBERT WOOLHAM  
1939



EDUCATION OFFICES, DEANSGATE, MANCHESTER



C I T Y   O F   M A N C H E S T E R  
E D U C A T I O N   C O M M I T T E E

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# STAFF

*School Medical Officer* : HENRY HERD, M.A., M.B., CH.B., D.P.H.  
(Retired July 1st, 1939)

*Acting School Medical Officer* (from July 1st, 1939) :  
J. GILBERT WOOLHAM, M.D., CH.B., D.P.H.

*Assistant School Medical Officers* :

SHEILA BRIDGEFORD, M.D., CH.B., D.P.H.  
HUGH CRAIG, L.R.C.P., L.R.C.S. (ED.),  
L.R.F.P.S. (GLASGOW).  
CAROLINE ROSE CRYSTAL, M.B., CH.B.,  
D.P.H.  
H. M. DICK, M.B., CH.B., D.P.H.  
ALEXANDER M. DUGAN, M.B., CH.B.,  
D.P.H.  
HENRY DUGUID, M.D., CH.B., D.P.H.,  
Barrister-at-Law.  
DOROTHY GUEST, M.B., CH.B., D.O.M.S.  
W. R. HONEYBURNE, M.A., M.D., CH.B.,  
D.P.H.

E. M. JENKINS, M.B., CH.B., D.P.H.  
H. MACKENZIE, M.B., CH.B., D.P.H.  
G. W. MATTHEWS, M.R.C.S., L.R.C.P.  
MARY A. J. MELVILLE, M.B., CH.B.  
S. F. REYNOLDS, M.R.C.S., L.R.C.P.  
MARY D. SHERIDAN, M.B., CH.B.  
L. W. SPARROW, M.B., CH.B.  
E. CALDERWOOD SMITH, M.A., M.B.,  
CH.B., D.P.H.  
D. OSWALD TAYLOR, M.D., CH.B., B.Sc.,  
D.P.H.

*Specialist Officers* :

*Consulting Orthopaedic Surgeons* : { \*E. D. TELFORD, F.R.C.S., M.Sc.  
\*HARRY PLATT, F.R.C.S., M.S.

*Consulting Ophthalmologist* : \*HARRY V. WHITE, M.C., M.D., CH.B.

*Consulting Surgeon (Nose and Throat)* : †\*BRIAN P. ROBINSON, M.B., CH.B., F.R.C.S. (EDIN.)  
*Psychiatrist and Medical Director of Child Guidance Clinic* : \*W. MARY BURBURY,  
M.A., M.D., B.S., D.P.M.

*Senior Dental Officer* : A. G. BATTEN, L.D.S., R.C.S.

*School Dental Surgeons* :

B. C. BETTS, L.D.S.	†L. MANION, L.D.S.
B. BROWN, L.D.S.	MARY M. PEACOCK, L.D.S.
A. L. CRAGGS, L.D.S.	*S. WOOD, L.D.S., R.C.S.
H. J. EAGLESON, L.D.S.	JESSIE I. RAMSDEN, L.D.S.
G. G. ELLIS, L.D.S., R.C.S.	ELIZABETH TIMPERLEY, L.D.S.
S. B. FILLINGHAM, L.D.S.	J. WHITEHOUSE, L.D.S.

*School Nurses* :

*Superintendent Nurse* : MISS K. S. TORROP

Nurse BARKER	Nurse M. M. JONES	Nurse RHODES
BARNES	LEWIS	ROBINSON
BARTON	LOWRY	ROTHERA
BERTIE	MAGUIRE	SALVIDGE
BLACKBURN	MASON	SCHOFIELD
BLACKHAM	MAXWELL	SHANNON
BRODERICK	MCENTYRE	SHOUT
CLUNAN	McGRATH	STANLEY
COLLINGE	McHUGH	STEPHEN
DICKSON	MCINTYRE	STERNSHINE
FARLEY	MEECH	SULLIVAN
FITZPATRICK	MILLER	TERRY-JONES
FOX	MOSS	Tomlinson
GIBBS	NICHOLSON	UNDERWOOD
HARRISON	NIXON	†WAINE
HAUGH	NODEN	WALKER
HERTERINGTON	OWEN	WALTON
HUMPHRIES	PALIN	WARE
JACKSON	PARRY	WEST
E. JONES	PIERCE-JONES	WHETSTON
E. LLOYD JONES	PRINCE	WHICHER
F. M. JONES	RAMSEY	WRIGHT

\* Part time duty

†On Active Service

Miss P. DAVIES  
Miss L. DEAN

*Dental Attendants:*

Miss J. B. RYDER

Principal Administrative Assistant : HARRY ROBINSON  
Administrative Assistants : ARTHUR DUNKS, HARRY HINSLEY, GEORGE A. HAWLEY

Clerks :

GEORGE WEBB  
ARTHUR CHANDLER  
JOHN DICKINSON  
THOMAS BROWN  
NORMAN LEIGH  
JAMES M. ROBINSON  
(B.A.ADMIN.)  
A. ROBERTS  
N. ANDERSON

AGNES ROSCOE  
EMMA HASLAM  
KATHLEEN McEWEN  
AGNES L. EDGAR  
EDNA JACKSON  
CONSTANCE WALFORD  
† ETHEL DURRANT  
ELIZABETH HALLARD  
† EDITH M. SIDEBOOTHAM  
DOROTHY BUSHBY

MARJORIE POOLE  
OLGA PAINTER  
HILDA WILLIAMS  
CLARICE GREEN  
JESSIE ELLISON  
BERYL HARGREAVES  
JOAN SIMPSON  
DOREEN ARNOLD  
MARGUERITE TULK

## SCHOOL CLINICS:

Ancoats .. .. ..	..	Cannel Street, Ancoats
Butler Street (Dental) ..	..	Butler Street, Ancoats
Central Clinic .. ..	..	Education Offices, Deansgate
Cheetham .. .. ..	..	Corner of Smedley Street and Cheetham Hill Road
Gorton .. .. ..	..	Gorton Road, West Gorton
Johnson Street (Dental)	..	Johnson Street, Bradford
Lancasterian (Orthopaedic)	..	Goulden Street, Oldham Road
Levenshulme .. ..	..	Stockport Road, Levenshulme
Moston .. .. ..	..	Moston Lane, Harpurhey
Newton Heath .. ..	..	Pilling Street, Oldham Road, Newton Heath
Northenden .. .. ..	..	Northenden Municipal School, Bazley Road, Northenden
Openshaw .. .. ..	..	1,460 Ashton Old Road, Hr. Openshaw
Shakespeare Street ..	..	69 Shakespeare Street, Chorlton-on-Medlock
Stretford Road .. ..	..	263 Stretford Road, Hulme
Child Guidance Clinic..	..	68 Lord Street, Cheetham

## ORTHOPAEDIC CLINIC — GOULDEN STREET

Superintendent Masseuse: Miss B. L. ASHWORTH

Massesuses: †Miss M. C. HOLDERNESS, †Miss ROBERTS, Miss STOUT

## CHILD GUIDANCE CLINIC:

Enquiry Officer : Miss B. J. SPEDDING, B.A.

Psychologists : { \*Mrs. E. HENSHAW, B.Sc.  
\*WILLIAM J. MESSER, M.A., M.Sc.

\* Part time duty      † Resigned during 1939

## RESIDENTIAL SCHOOLS :

Summerseat Open-Air School for Delicate Girls, Summerseat, near Bury, Lancs.	..	..
Soss Moss School for Epileptic Children, Chelford, Cheshire	..	..
Manchester Residential School for Crippled Children (Dr. Rhodes Memorial Home), Cavendish Road, Didsbury	..	..
(Evacuated to Mobberley Hall, Sept. 1939)	..	..
Manchester Residential Open-Air School for Delicate Boys and Girls, Styal, Cheshire	..	..

### NON-RESIDENTIAL (DAY SPECIAL):

Lancasterian School for Crippled Children, Goulden  
Street, Oldham Road ... . . . .  
(Evacuated to Cloverley Hall, Whitchurch,  
Sept. 1939.  
Crumpsall Day Open-Air School for Delicate  
Children, Middleton Road, Crumpsall

### Visiting Medical Officer :

CHARLES WM. CRAWSHAW,  
M.B., CH.B.  
R. J. MACKESSACK, M.A.,  
M.D., CH.B.  
E. D. TELFORD, F.R.C.S.,  
M.S.C.

R. EDMONDSON, M.B., CH.B.

E. D. TELFORD, F.R.C.S.,  
M.Sc.

# INTRODUCTION

The Acting School Medical Officer herewith presents his first Annual Report, which describes the work of the School Medical Service during 1939.

He wishes to acknowledge gratefully the unstinted efficient co-operation and the valuable help given by the various branches of the School Medical Staff and by other Officials of the Manchester Education Committee.

At the end of June, Dr. Henry Herd retired on Superannuation from the position of School Medical Officer which he had held for nine years. His tenure of office was notable for the special interest which he took in the administrative problems raised by children who showed abnormally troublesome behaviour and by his interest in those who were less gifted than usual intellectually.

His extensive work on their behalf will have a lasting effect for good and will be well remembered. Manchester has been very fortunate in having had at the head of the School Medical Department Dr. Ritchie, who was the first School Medical Officer, and Dr. Herd, his successor.

At the beginning of the year, Dr. H. Craig of Preston was appointed to fill the vacancy caused by the resignation of Dr. Ruby Winning because of her marriage. In July, the number of the Assistant School Medical Officers was reduced by my appointment as Acting School Medical Officer.

The outstanding event of the year was the evacuation of 59,000 school children to the towns and villages scattered over five counties. This exodus occurred at the beginning of September, two weeks after the re-opening of schools at the close of the Midsummer Holidays.

J. GILBERT WOOLHAM  
Acting School Medical Officer

# REPORT

## EVACUATION

The evacuation of children from all parts of Manchester, excepting Wythenshawe, which is regarded as a neutral area, dislocated at once the greater part of the School Medical Service because all the schools and clinics in the City were closed immediately the order for evacuation was received. No Medical Service, except that which was needed at the railway stations during the entraining, was given on the days which were occupied by the removal into the reception areas.

### (A) RECEPTION AREAS

Medical Officers, Dental Surgeons, Nurses and Helpers took up their duties in the various reception areas in order to assist the Staffs of the Local Education and Public Health Committees to deal with the new populations which they had acquired.

This was done in answer to the calls made by the County and other Medical Officers following the offers of assistance which had previously been made. The Staff loaned from Manchester comprised eight Medical Officers, six Dental Surgeons, and twenty-eight Nurses who were allocated to the areas named below :—

The towns of Blackpool, Bacup; Darwen, Lytham St. Annes, Congleton, Macclesfield, and the Counties of Cheshire, Derbyshire, Lancashire, and Staffordshire—Shropshire did not ask for assistance from Manchester.

Problems of administration soon arose in the reception areas ; many of them were new problems outside the range of ordinary expectation, but the mutual assistance which the officers of the reception and evacuation authorities gave under the unusual circumstances brought to solution the various difficulties.

Many of the parents felt inconveniences and hardships which they deemed intolerable and to be removed only by the reconstitution of their homes again as a whole or in part, thus neglecting the reasons for evacuation on a large scale, which still exist.

If the children moved out of Manchester in September had been refugees instead of evacuees there probably would have been a tale different from that which has been told for the natural feeling against having another "brood in the nest," the effects of the differences between the upbringings and habits of the receptionists and the received, would all have been neutralised by the deep feelings of patriotism and pity that would have been engendered.

### *Uncleanliness*

It is unfortunate that there is always a proportion of the school population which remains, in spite of all efforts at present permissible, in a state of uncleanliness.

It was this condition and enuresis, which many receptionists considered to be due to lack of proper training, that caused antagonisms and prevented the happy relationships between the different households

which might have been formed, as they were in the more fortunate billets.

Uncleanliness continues not because the parents are unaware of their children's condition and not because they are ignorant of cleansing processes, for the nurses have been issuing instructions and keeping the children under supervision, to abate uncleanliness, during as many years as the school medical service has been in existence and they are enough for the children who were inspected in the early years to be adults now and to be sending their children to school.

Uncleanliness cannot be abolished from the schools whilst re-infection of cleansed school children occurs in the homes where the older ones, who have left school, harbour nits and vermin.

The following figures relate to the percentage of persons over school age admitted to two Municipal Hospitals during the periods January 1st to September 1st, 1939, and September 1st, 1939, to April 30th, 1940.

HOSPITAL "A." PERIOD, JANUARY 1ST TO SEPTEMBER 1ST, 1939

Males :	14 to 18 years of age ..	..	6.5 per cent. infested
	19 years and over ..	..	None ..
Females :	14 to 18 years of age ..	..	23.4 ..
	19 years and over ..	..	10.1 ..

SEPTEMBER 1ST, 1939 TO APRIL 30TH, 1940

Males :	14 to 18 years of age ..	..	1.5 per cent. infested
	19 years and over ..	..	0.3 ..
Females :	14 to 18 years of age ..	..	12.2 ..
	19 years and over ..	..	4.8 ..

HOSPITAL "B." JANUARY 1ST TO SEPTEMBER 1ST, 1939

Males :	14 to 18 years of age ..	..	33.3 per cent. infested
Females :	" ..	..	66.6 ..

JANUARY 1ST TO APRIL 30TH, 1940

Males :	14 to 18 years of age ..	..	10 ..
Females :	" ..	..	45.5 ..

There is indifference to this infection because it is thought that a few nits on the scalp hair can do no harm. Persistent efforts therefore, are not made by the mother to keep the children completely free, and if by chance there are unexpected prolonged demands on her time, slight infections become worse.

If it is not in the family tradition to be punctiliously clean in this respect, it is difficult to bring about a change for the better because it is not the recognition that her child is unclean but abhorrence of that condition which she thinks may be noticed also by others that drives even the very tired mother to her duty.

### Evacuation and General Health

The Assistant School Medical Officers and the Nurses have reported that the children evacuated to many reception areas have benefited. At least, their appearance is better as a whole since their change into billets. This is the general impression that has been received but no Medical Officer has had facilities enabling sufficient numbers of

unusually increased heights and weights to be recorded and brought in confirmation.

Unfortunately, impressions are not always reliable but, when actual rates of increases cannot be quoted it is something of worth to be able to say that the children appear to be more alert and brighter than when they first appeared in the reception areas.

Earlier to bed, new and pleasurable interests, unfiltered skyshine and sunshine and new clothing are very important factors in the production of the different and better appearance. They cause eyes to brighten, cheeks to colour, circulation and respiration to improve, and the picture thus created is one of a more efficient state of nutrition.

*Assistance to Reception Areas : by (a) Medical Officers, (b) Dental Surgeons, (c) Nurses*

(a) It has been mentioned earlier in the Report that the services equal to that of the full time of eight medical officers were loaned to the different reception areas. Whilst these medical officers were in the areas they, of course, acted under the instructions of the Authority to which they were loaned.

In those clinics where it was possible for the Manchester doctors to undertake the prescription of spectacles this was done.

In several places a temporary clinic was instituted for school children with defective vision and outfits for the measurement of errors of refraction were loaned together with sets of numbered spectacle frames of various sizes from which the correct one for each child could be selected. Thus, it was possible for a medical officer, who prescribed spectacles for an evacuee, to send full particulars of what was required to Manchester and obtain in return suitable glasses for the child. Also, it was possible for inquiries to be then made into the ability of the child's parent to pay for the glasses and to make an assessment when necessary. This arrangement relieved the reception authorities of a considerable amount of book-keeping, and it tended to minimise the time of waiting for the glasses.

In certain country districts, where the billets were a long distance from the school clinics, the measurements of errors of refraction were made at the schools. The medical officer took the necessary equipment with him and improvised a darkened room for the work.

It was not possible for the Manchester doctors to limit their work to that of looking after Manchester evacuees only and similarly for the doctors of the reception areas, their work was not confined to dealing with children ordinarily resident in the areas.

The Crippled and other "Exceptional Children" whose parents desired them to be evacuated were sent to special billets where appropriate teaching and treatment could be given, the treatment being directed in the same manner as before by the specialist officer concerned.

(b) Mr. Batten reports :—

" Routine dental work in the City temporarily ceased with the commencement of the summer vacation, the arrangements for the impending dispersal of school children, which commenced almost

immediately the clinics were re-opened in August soon disposed of any idea of the continuance of routine duties.

(c) There were 28 nurses loaned to reception areas and they worked under the direct instructions of the Authority to which they were loaned. It is well known that the greater portion of their time, at first, was taken up by the attention given to uncleanliness and the cleansing of children's heads. In one reception area quite close to Manchester nurses and bath attendants were specially sent out on the few days immediately following evacuation, to put the children into a condition suitable for ordinary billets.

The problem of keeping children clean in ordinary billets, in reception areas, has been a difficult one. During the comparatively short time that some of them were in the areas they had to be cleansed on several occasions, five or six times in some instances. It was hardly ever possible to be certain how the re-infection occurred, but many of the evacuees returned home for week-ends and relatives visited them in their billets : yet this was not the explanation in all cases.

The children who have been sent to reception areas since the first quick exodus were sent only after a medical examination and a thorough cleansing when that was found necessary, also, children suffering from minor ailments were treated and cured before being allowed to go.

Expectant mothers desiring evacuation have also been examined by doctors and nurses in order to ensure that they would not go to reception areas in an unsuitable condition and children under school age were examined in the same way. Manchester school doctors and nurses convoyed the expectant mothers to the reception areas.

## (B) THE EVACUATED AREA, MANCHESTER

### SCHOOL CLINICS

The work of the school clinics was, like other branches of the service, greatly restricted owing to the evacuation of school children. Immediately evacuation had taken place, four of the larger school clinics were re-opened and treatment was given to those children who presented themselves. For a period of two months following evacuation, the numbers attending at these four clinics were extremely small. As the children returned from reception areas the attendances increased and the return of the medical and nursing staff enabled other school clinics to be re-opened.

In order to give information that treatment at certain clinics was available, school nurses visited the homes of children known to be suffering from defective vision, ear disease, and orthopaedic conditions. If it were found that the children concerned were in Manchester they were informed that treatment could be continued and it was hoped that these visits would cause the information to be spread that school clinic treatment was available.

A survey of the sections of Table IV, when compared with those of the past few years, will show that the number treated under each section is approximately 75 per cent. of the numbers of a normal year. The numbers in the various groups treated at the school clinics were as follows :—

Group I.	Minor ailments .. .. ..	29,889
„ II.	Defective vision and squint .. .. ..	8,179
„ III.	Defects of nose and throat .. .. ..	3,749
„ IV.	Orthopaedic and postural defects .. .. ..	1,418
„ V.	Dental defects .. .. ..	20,067
„ VI.	Uncleanliness and verminous conditions : Total examinations made .. .. ..	161,928
	No. of individual children found unclean .. .. ..	8,799
	Number of children cleansed under Section 87(2) and (3) of the Education Act .. .. ..	3

The opportunities for the inspection of children in regard to cleanliness were nearly non-existent from the time of evacuation until the end of the year. In the latter months of the year, several schools were re-opened on a voluntary basis and under the tutorial scheme of education. So far as possible, these children were seen in regard to general cleanliness and their condition was found to be very good because the children attending the schools were generally those from homes where the parents were anxious for their children's welfare, both educationally and physically.

An attempt was made to ascertain the degree of cleanliness amongst children who were not sent to school. The school nurses visited several hundred homes for this purpose and they gained admission to  $33\frac{1}{3}$  per cent. of those visited. Where the parents agreed, the children in the home were inspected. The results of these inspections showed that 25 per cent. of those inspected in the homes were verminous and 20 per cent. were suffering from untreated minor ailments. It was, however, impossible to go further with the cases of uncleanliness than to advise parents. Many cases were seen not more than once : the children were either "not at home" when the nurse called again, or the parent refused a further inspection. In regard to untreated minor ailments, pressure was brought to bear on the parents to seek treatment and satisfactory results were obtained.

By these visits, the Acting School Medical Officer could well visualise what the condition of the children would be on the re-opening of the schools, but this is a matter for consideration in the report for the year 1940.

### THE SCHOOL DENTAL SERVICE, 1939

The following is the report of the Senior Dental Officer, which is confined mainly to a summary of events of the year.

"Reference to the statistical tables for 1939 will show that the numbers of children inspected and treated are considerably lower than in previous years, the main cause of this being the outbreak of war with the consequent evacuation of school children from the City.

“ 29,612 children were examined in the elementary schools and of these 21,870 (73 per cent.) were found to require dental treatment. This percentage is about the same level as found in the County Boroughs of the country generally. Comment has been made in previous reports on the high percentage of children showing dental defects ; it has also been inferred that this percentage should drop in future years. This might happen, but only under certain circumstances.

“ To obtain any appreciable reduction in the percentage of children showing untreated dental defects it will be necessary to provide a full dental service for the pre-school child and the entire school population, and further to eliminate from the statistical returns those who constantly refuse to obtain treatment when advised.

“ Of the 21,870 children referred for treatment at routine dental inspections 13,981 (64 per cent.) were treated at the school clinics. In addition, 6,088 children were treated as casual cases. These latter were for the most part children from schools not included in the City's dental scheme, and attended the clinics for relief of toothache.

“ The treatment provided during the year included 9,217 fillings, 41,815 extractions, and the administration of 5,734 general anaesthetics.

“ Under the heading ‘ Other Operations ’ in the statistical table, 2,433 treatments were given. These included emergency dressings, silver nitrate treatments, root dressings and fillings, scalings, and general prophylactic measures.

“ Dental treatment has been provided at the clinics for children from Nursery Schools, the Day Special Schools for Mental and Physical Defectives, Secondary and Technical Schools. Visits have also been paid to the Residential Schools at Summerseat, West Didsbury, and Styal Cottage Homes, by members of the Dental Staff. Details of the treatment provided for the children in attendance at these schools and institutions are to be found in the appropriate statistical tables.

“ Lectures on dental matters were given at a few schools during the year but no great amount of time was expended on this work. It is felt that whilst the value of propaganda in the form of talks and posters must not be underestimated, a more lasting effect is obtained when this takes the form of well-established clinics and a high standard of dental treatment.

“ Following the dispersal of the school children four of the local dental clinics were re-opened on a part-time basis and, in one district, scheduled as a neutral area, a Dental Officer returned to full-time duties. Attempts were made to institute routine dental work for those children remaining in the City, but the difficulties of making appointments for children whose attendance at school was only a matter of conjecture, seriously impeded any real progress in this respect.

“ It is felt that the study of measures for the prevention of dental caries should be an essential part of the School Dental Service, whether it will be possible to put into operation plans which have been formulated in this respect depends on the development of future events.

"I take this opportunity of extending my thanks to those members of the Authority's staff, both administrative and professional, who by their co-operation, have given me a considerable amount of assistance during a difficult year."

## REPORT ON CHILD GUIDANCE CLINIC

During the present year the Child Guidance Clinic has continued to grow. The actual intake of cases is smaller than last year because during the last four months of the year it was possible to do very little work, owing to evacuation.

In April a scheme was arranged for including such Education Authorities as wished to co-operate within the scope of the work of the Clinic. This plan actually came into operation at the beginning of November and already a few cases have been referred.

The war has, of course, made a great difference in the work. So far as the Clinic is concerned we have made two rounds of visits to the parents of patients attending at the end of July, one during September and one near the end of November, and the bulk of our patients are still evacuated.

In visiting some of the reception areas the main problem which is complained of is that of enuresis. In some cases this is obviously a symptom which has previously been overlooked by the parents, in others it appears to be an anxiety response directly due to evacuation.

As well as in the reception areas generally a number of children who have proved difficult and failed in their billets have been temporarily accommodated in homes already established by the Authority, and occasional visits have been made to these homes.

The Clinic has had to transfer from the premises at Atherton Street which were no longer suitable, and has found temporary hospitality in the Central High School.

No. of cases carried over from previous years	62
No. of cases referred during whole of 1939	81
<i>Problems</i>	
Nervous disorders .. .. .. ..	12
Habit .. .. .. ..	16
Behaviour .. .. .. ..	47
Intellectual .. .. .. ..	6
<i>Disposal</i>	
Still under treatment .. .. .. ..	39
Still under supervision .. .. .. ..	*54
Advisory only .. .. .. ..	17
Sent to approved schools (5 on the clinic's recommendation) .. .. .. ..	6
Parents unwilling to attend .. .. .. ..	8
Discharged, adjusted, or improved .. .. .. ..	19
* Including children still evacuated but not discharged	
<i>I.Qs. of children tested</i>	
Below 70 .. .. .. ..	7
70—90 .. .. .. ..	15
90—110 .. .. .. ..	39
Over 110 .. .. .. ..	15

## THE ORTHOPAEDIC CLINIC

The Orthopaedic Clinic, which is held in the building of the Lancasterian Day Special School for Crippled Children, continued its normal work until the children belonging to the school were evacuated to Cloverley Hall, Whitchurch.

As we were unaware how many children on the roll of the Orthopaedic Clinic had been evacuated the School and the Clinic were closed and the staff of four masseuses accompanied the Lancasterian children to Cloverley Hall. Before the end of the year two of the masseuses resigned on account of marriage and the remaining two continued to give treatment as far as equipment would allow to those children resident at Cloverley Hall. Gymnastic treatment by means of apparatus, i.e. wall bars, etc., could not be given and there was no treatment by electricity. The treatment given to the evacuated children therefore consisted of massage and remedial exercises which could be undertaken without apparatus.

The following is a report by Mr. E. D. TELFORD, the Consultant Orthopaedic Surgeon.

"The work of this Clinic proceeded on normal lines until the outbreak of war, when the evacuation of children and the use of the premises for A.R.P. work brought the work to a close for the time being. A few cases have attended for examination at the Shakespeare Street Clinic and it is hoped that an Orthopaedic Clinic may again be started in the near future. The figures given below refer not to a full year but cover a period of eight months to August 31st, 1939 :—

Rickets	..	..	..	..	..	..	32
T.B. Hip	..	..	..	..	..	..	2
T.B. Knee	..	..	..	..	..	..	3
T.B. Ankle and Elbow	..	..	..	..	..	..	1
Scoliosis	..	..	..	..	..	..	9
Kyphosis	..	..	..	..	..	..	3
Kypho-scoliosis	..	..	..	..	..	..	1
Anterior Poliomyelitis	..	..	..	..	..	..	10
Hemiplegia	..	..	..	..	..	..	6
Sphastic Paralysis	..	..	..	..	..	..	11
Obstetrical Paralysis	..	..	..	..	..	..	2
Post-Diphtheric Paralysis	..	..	..	..	..	..	1
Fracture, Femur	..	..	..	..	..	..	1
,, Skull	..	..	..	..	..	..	1
,, Elbow	..	..	..	..	..	..	1
Congenital Absence Pectoralis Major	..	..	..	..	..	..	2
,, Dislocation, Hip	..	..	..	..	..	..	3
,, Deformity, Femur	..	..	..	..	..	..	1
Dislocation, Finger	..	..	..	..	..	..	1
Hallux Valgus	..	..	..	..	..	..	7
Hammer Toe	..	..	..	..	..	..	2
Flat Foot	..	..	..	..	..	..	15
Deformity, Toes	..	..	..	..	..	..	4
,, Feet	..	..	..	..	..	..	3
,, Elbow	..	..	..	..	..	..	1
,, Finger	..	..	..	..	..	..	2
Talipes	..	..	..	..	..	..	3
Pes Cavus	..	..	..	..	..	..	2
Torticollis	..	..	..	..	..	..	6
Sprengel's Shoulder	..	..	..	..	..	..	1
Old Injury, Knee	..	..	..	..	..	..	1

Old Septic Arthritis..	..	..	..	..	1
Burn, Hand ..	..	..	..	..	1
Synovitis, Knee ..	..	..	..	..	2
Exostosis ..	..	..	..	..	1
Scar, Thumb ..	..	..	..	..	1
Perthe's Disease ..	..	..	..	..	1
Pseudo Hypertrophic Muscular Dystrophy ..					1
Atrophy ..	..	..	..	..	1
Subluxation Clavicular Joint ..	..	..	..	..	1
					<hr/>
			Total	..	148

Total number of cases supervised .. 700  
 Total attendances for treatment .. 2,735

NUMBER OF INDIVIDUAL TREATMENTS					
Artificial Sunlight ..	..	..	..	..	2,593
Massage ..	..	..	..	..	2,561
Exercises ..	..	..	..	..	1,922
Fitting corrective appliances ..			..	..	48
			Total	..	<hr/> 7,124

(Sgd.) E. D. TELFORD, F.R.C.S.  
 Consulting Surgeon.

### STYAL COTTAGE HOMES

The work in the care of children at these Homes has proceeded on the lines of former years. Dr. R. Edmondson, the Visiting Medical Officer, has conducted a routine medical examination of all children in the Institution and has been responsible for the treatment of those children admitted to the Institution's Hospital. Influenza and chills were responsible for the majority of the cases admitted to this Hospital, while the more serious cases were transferred to the Corporation Children's Hospital—Booth Hall Hospital—for treatment. Cases of notifiable infectious disease, of which there were six, were transferred to the City's infectious diseases' hospital.

All the children in the Homes received dental inspection from one of the Committee's Dental Surgeons, and such treatment as was found to be necessary was carried out by him.

Cases of serious eye disease and cases of defective vision were referred to the Visiting Consultant Oculist, Dr. J. McBride. Spectacles were prescribed in 11 instances of the 19 cases submitted for his opinion.

The minor ailments' clinic continues to undertake a great amount of work. During the year 26,201 treatments were given to cases falling within this category.

### SPECIAL SCHOOLS

The following special schools came within the evacuation scheme and arrangements were made for the education and treatment of the children as follows :—

- (1) Dr. Rhodes' Home—Residential School for Crippled Children.
- (2) Lancasterian Day Special School for Crippled Children.
- (3) Six Day Special Schools for Mental Defectives.
- (6) Styal Residential Open-air School for Delicate Children.
- (7) Crumpsall Day Open-air School.

### (1) DR. RHODES' HOME—RESIDENTIAL SCHOOL FOR CRIPPLED CHILDREN

Sir Noton and Lady Barclay generously placed their home at Mobberley Hall, Mobberley, Cheshire, at the disposal of the Education Committee for the use of the children at this school. The number of children transferred was 80.

The school soon settled down to its usual routine and Mr. E. D. Telford, the visiting consultant surgeon, continued his supervision and treatment of the children. The following is his report for the year :—

“ The number of children in the School on December 31st, 1939, was 73 compared with 70 on December 31st, 1938. During the year 43 new cases were admitted. There were under treatment during 1939 a total of 113 children.

“ These cases may be classified as follows :—

Spastic Paralysis	..	..	..	..	36
Rickets	..	..	..	..	20
Anterior Poliomyelitis	..	..	..	..	15
Scoliosis	..	..	..	..	6
Hallux Valgus	..	..	..	..	5
Amputations	..	..	..	..	3
Fragilitis Ossium	..	..	..	..	3
Perthes' Disease	..	..	..	..	3
Talipes	..	..	..	..	3
Myasthenia	..	..	..	..	2
Various other Deformities	..	..	..	..	17
					—
					113

“ The 40 cases discharged during the year, cured by operation or so far improved as to be fit for school or work were made up as follows :—

Rickets	..	..	..	..	9
Hallux Valgus	..	..	..	..	5
Torticollis	..	..	..	..	3
Deformity of Toes	..	..	..	..	3
Hammer Toe	..	..	..	..	3
Talipes	..	..	..	..	3
Spastic Paralysis	..	..	..	..	3
Various other Deformities	..	..	..	..	11
					—
					40

“ The number of operations performed by me at Booth Hall Infirmary on children from the school was 21. These consisted of tenoplastics for paralysis, correction of deformities of the feet and of torticollis.

“ The general health of the school has been excellent ; there has been no epidemic disease.

“ The great event of the year has been the removal of the school to Mobberley. Considering that we were barely settled down after our removal from Swinton to West Didsbury, the sudden removal to Mobberley at the outbreak of war was carried out very smoothly ; this was largely due to the devoted work of Miss Draper and her Staff.

“ The school is now very comfortably and efficiently housed at Mobberley Hall, and for this fortunate result we are deeply indebted to the kindness of Sir Noton and Lady Barclay.

(Sgd.) E. D. TELFORD, F.R.C.S.  
Consulting Surgeon

## (2) LANCASTERIAN DAY SPECIAL SCHOOL FOR CRIPPLED CHILDREN

Through the kindness of Mr. Christopher Nicholls, of Cloverley Hall, Calverhall, nr. Whitchurch, Salop, the children from this school were housed in a portion of the Hall. To accommodate them several alterations were necessary and these were undertaken after the children were installed. In spite of the difficulties of the transition from a day school to a residential school, the children soon comfortably settled in their new quarters and their education and treatment were continued. Mr. E. D. Telford also continued his supervision of the children in their new home.

The following figures relate to the treatment given to the children:—

### LANCASTERIAN REMEDIAL DEPARTMENT

*Number of Treatments for year 1939 to the time of Evacuation*

Massage .. .. .. ..	2,810
Medical Gymnastics .. .. ..	2,714
Medical Electricity .. .. ..	1,689
<hr/>	
	7,213

*From September 1st to December 31st, 1939*

Massage .. .. .. ..	972
Medical Gymnastics .. .. ..	427
	1,399
<hr/>	

(Medical Electricity — Nil)  
Total .. 8,612

The following figures show the numbers evacuated and the number remaining at the end of the year :—

	Dr. Rhodes' Home		Lancasterian School	
	Boys	Girls	Boys	Girls
Number evacuated .. .. ..	31	49	62	44
Number leaving the schools ..	3	10	20	22
Number admitted to the schools ..	4	—	8	4
Number remaining, December, 1939	32	39	50	26

## (3) DAY SPECIAL SCHOOLS FOR MENTALLY DEFECTIVE CHILDREN

434 children on the registers of the Six Day Special Schools for Mental Defectives were evacuated to Lytham St. Annes.

It was considered inadvisable for these children to be sent to ordinary billets and therefore accommodation was found for them in buildings which in normal times were convalescent homes for delicate children, or were seaside holiday homes for poor city children. This arrangement was of a temporary nature and later the children were transferred in groups to large houses rented by the Manchester Education Committee. In some instances the houses were large enough to provide room for teaching purposes as well as residence ; in others the houses were for residence only, and the children were taught in other buildings.

At the end of the year there were 256 children remaining in the reception area but these were not all part of the number which was originally evacuated in September. The following table shows how the numbers changed :—

	Total
Number evacuated in September .. .. .. ..	439
Number who left before December 31st .. .. .. ..	232
Number admitted between September 1st and December 31st .. .. .. ..	16
Number remaining on December 31st .. .. .. ..	223

In order to assist the Medical Officer of Health for this district the half-time services of a Medical Officer and the services of two nurses were loaned to him. There were many cases of uncleanliness and skin disease amongst the children, including scabies. The two nurses were kept fully occupied over a period of months in treating these conditions. For cases of uncleanliness and scabies the Medical Officer of Health provided a special section at one of the public baths while the other cases of minor ailment were treated at the school clinics. The several houses were visited in rotation by the nurses and all unsatisfactory cases were referred to the local school clinic where the part-time Medical Officer from Manchester attended. The whole of the children were periodically inspected by this Medical Officer and the procedure was continued without interruption until the end of the year. Cases of illness occurring amongst the children, and which were not suitable for hospital treatment, were nursed in their respective homes by the school nurses. At the end of the year it was possible to recall one of the nurses.

All the children received a full physical examination during the four months, and those found to have defective vision were provided with spectacles and cases of dental caries received treatment by one of the Manchester dental surgeons loaned to the neighbouring Authority of Blackpool.

The difficulties of maintenance of suitable clothing and footgear were overcome by the teachers whose labours to make the children comfortable and happy cannot be too highly praised.

#### (4) SOSS MOSS RESIDENTIAL SCHOOL FOR EPILEPTIC CHILDREN

This school, situated near Chelford, Cheshire, was not within an evacuation area and therefore continued to function as in normal times.

The numbers of Manchester children in the school during the year were as follows :—

	Boys	Girls	Total
In residence on January 1st, 1939 .. ..	23	10	33
Admitted during the year .. ..	7	5	12
Discharged during the year .. ..	8	3	11
Remaining in residence on December 31st, 1939 .. .. .. ..	22	12	34

The following is a short report by Dr. R. J. MACKESSACK, the visiting Medical Officer :—

“ During the year the health of the school has been very good on the whole but we unfortunately lost two children, one dying in hospital of tuberculosis of the lungs following double pneumonia, and the other as the result of an uninterrupted series of fits.

“ One child had acute appendicitis and was removed to hospital for operation and made a good recovery.

“ There were other minor illnesses and accidents but nothing of any consequence, and except for four cases of chickenpox there was complete freedom from infectious disease.

“ The usual period of three weeks in camp at Blackpool was much enjoyed and was of much benefit to the health of the children.”

(Sgd.) R. J. MACKESSACK, M.D.

#### (5) SUMMERSEAT RESIDENTIAL SCHOOL FOR DELICATE GIRLS

This school also was outside the evacuation area and continued almost in the same manner as in peace time.

Owing to the evacuation of so many children from the city, which included children awaiting admission to this school, the vacancies occasioned by discharges were not quickly filled. The beds available, however, were used by girls who were causing difficulties in reception areas. This arrangement was of great assistance to the reception areas who were often handicapped by lack of suitable accommodation for such children and because the removal of the child was an urgent necessity, the matron of the school undertook to cleanse girls and make them fit for an ordinary billet. The distance between the reception area and the school often required that such children should be kept in the institution for one or two nights.

The following is a report by Dr. C. W. CRAWSHAW, the visiting Medical Officer :—

“ Number of children in residence on January 1st, 1939 .. ..	29
Number of children admitted during 1939 .. .. ..	44
“ “ “ discharged during 1939 .. .. ..	45
“ “ “ in residence on December 31st, 1939 .. .. ..	27

“ In January, one child was in bed for three weeks suffering from repeated attacks of asthma.

“ In February, four children were in bed ten days, suffering from scabies.

“ In April, Mr. Ellis, one of the Committee's dental surgeons, visited the school and extracted teeth in several cases.

“ In June, the asthma patient was discharged.

“ In August Miss Bailey, the Matron, retired.

“ In September there were 20 children in residence. The school was appointed as a cleansing station for verminous children (Ramsbottom evacuees) and special cases sent from the Education Offices.

“ In October there were 21 children in residence. Eight new cases were admitted.

“ In December Mr. Ellis again visited the school.

“ Apart from the instances quoted above, the health of the children and staff has been very good.”

(Sgd.) C. W. CRAWSHAW, M.B., CH.B., D.P.H.

#### (6) STYAL RESIDENTIAL OPEN-AIR SCHOOL FOR DELICATE CHILDREN

Just prior to the evacuation of school children from the city, children in residence at this school were returned to their homes in order that they might be evacuated with the children from their own city school. The school then became a residential school in a reception area for nursery school children and children from Palmerston Street and Shakespeare Street Day Nursery Schools, which are the Education Committee's schools, were transferred there.

Provision was also made for children from the two voluntary organisations, viz. : Collyhurst Day Nursery School and Rosamond Street Day Nursery. The staffs from these various schools accompanied the children, and many voluntary helpers gave part-time service. As vacancies occurred they were filled by young children under the age of five years where mothers wished evacuation for them but were unable themselves to leave their homes.

The following figures show the numbers of boys and girls who were in the residential school from the beginning of the year to the time of their dispersal :—

	Boys	Girls	Total
In residence on January 1st, 1939	57	38	95
Admitted during the year	97	65	162
Discharged during the year	95	53	148
Number in residence at the time of evacuation	59	50	109

The following figures give the number of nursery school and other young children being cared for at this school from September 1st to the end of the year :—

Number transferred on September 1st, 1939	..	..	152
Additional number admitted to December 31st, 1939	..	..	40
Number leaving to December 31st, 1939	..	..	117
Number remaining on December 31st, 1939	..	..	75

The children were under the medical supervision of Dr. EDMONDSON, the visiting Medical Officer to the open-air school. He makes the following report :—

“ Until the outbreak of war in September this Institution was used for anaemic and debilitated children transferred from the Manchester schools on the recommendation of the Medical Officers. The children remained about six months before being transferred back to their homes.

“ Early in September the Institution was taken over by four Manchester Nursery Schools—Collyhurst, Rosamond Day School Nursery, Palmerston Street and Shakespeare Street. At the beginning of their occupation there were about 152 children, and their staffs, but by the end of the year many of these children had returned home.

“ Since the arrival of these Nursery Schools one home has been converted into a hospital with an isolation room, for the treatment of minor ailments, but all serious cases are transferred to Booth Hall.

“ A medical inspection is made of any sick children four times a week, or more often if necessary.

“ The Nursing Staff of the Manchester Residential Open-Air School has remained in attendance.

"The general condition of the children has much improved since their arrival at this Institution."

#### (7) CRUMPSALL DAY OPEN-AIR SCHOOL

This school, being within the evacuation area, was closed and the children attending advised to register for evacuation at the school from which they were transferred to the open-air school. The school was closed during the remainder of the year.

The numbers attending the school during the time the school was open were :—

		Boys	Girls	Total
On the registers on January 1st, 1939	..	128	123	251
Admitted during the year	.. .. ..	83	70	153
Discharged during the year	.. .. ..	92	75	167
Remaining on the registers at the time of evacuation	.. .. .. ..	119	118	237

#### NUTRITION

The following is a table of comparisons of the percentages of the A, B, C, D, classification of the nutrition of children, as shown in Table II for the present year and the previous year :—

Age-groups	Number of Children Inspected	A. (Excellent)		B. (Normal)		C. (Slightly sub-normal)		D. (Bad)	
		No.	%	No.	%	No.	%	No.	%
Entrants .. 1938 ..	10,750	2,159	20.08	7,716	71.78	866	8.06	9	.08
" .. 1939 ..	7,293	1,317	18.06	5,405	74.11	566	7.76	5	.07
Second Age-group 1938 ..	8,552	1,288	15.06	6,349	74.24	906	10.59	9	.11
" .. 1939 ..	5,715	901	15.77	4,224	73.91	588	10.29	2	.03
Third Age-group 1938 ..	7,303	1,404	19.22	5,341	73.13	554	7.6	4	.05
" .. 1939 ..	4,551	929	20.41	3,220	70.75	397	8.72	5	.11
Other Routine Inspections ..	5,107	1,257	24.61	3,519	68.91	329	6.44	2	.04
1939 ..	3,032	598	19.72	2,244	74.01	189	6.23	1	.03
Total .. 1938 ..	31,712	6,108	19.26	22,925	72.29	2,655	8.37	24	.08
Total .. 1939 ..	20,591	3,745	18.19	15,093	73.3	1,740	8.45	13	.06

I suggest that the word "nutrition" should be used to indicate the composite function which includes digestion, absorption, and assimilation, together with other nutritive processes.

If the word were used with that force then the phrase "the state of nutrition" would refer to the grade of efficiency of the combined nutritive processes just mentioned. It would not refer to the physical state of the body, though that would reflect, under good conditions, "the state of nutrition."

The poor condition of the body which is the result of improper and scanty feeding may often belie the potentialities of the nutritive processes of some children and beget a diagnosis of bad nutrition when bad nutriment should be assigned as the cause.

A good bodily condition may, rightly, justify the diagnosis of good nutrition but a bad physical state does not necessarily justify one of bad nutrition, for the bad physical state may be due to a hampering of the efficiency of the function of nutrition, which is wanting the opportunity to work to its full capacity because of insufficiency of good food and possibly because of the influence of bad environment.

A poor bodily condition when, regarding food and environment there is a satisfactory history, leads to a diagnosis of bad nutrition.

An inquiry might determine to what degree this state of the nutrition in particular cases is due to disease, to poor environment, or to inheritance.

It should be borne in mind that the nutritive functions are under the influence of heredity, exercise, inactivity, health, disease, play, work, sleep, and a hundred and one other factors which affect nutrition for better or worse by their working together, at different degrees of intensity, in different combinations not all of the same value, at different times, over the whole period of life, a period extending from time previous to birth to the time of death.

It is an impossible task to go deeply into all these considerations when assessing the so-called "state of nutrition" during a routine medical examination in school.

It may be presumed, I think, that most medical officers are guided chiefly by appearances rather than by functional abilities when placing children in the four categories—A, B, C, D, of nutrition—as directed by the Board of Education. If the presumption be correct, it follows that the children in the group D are placed there because they have the appearance of being ill-fed.

It may be useful to be told how many children have that appearance, but an endeavour should be made to discover who of the number actually are in want of the nutriment that might enable their bodies and functional abilities to be better exercised and consequently better developed.

In some places, in addition to the results of inspection those of physical measurements have been used in the form of "indices of nutrition" to help in the classification of children. There is no doubt that these indices have their uses as pointers between the occasions of more extensive medical examinations, as Dr. Honeyburne states in his article printed in this Annual Report. Weight/Height of the child enters into many of them, possibly because it is presumed that the greater the weight of a unit of thickness of the transverse section which this fraction represents, the better is the bodily condition.

The many variations of this index which are in use show that it is hardly satisfactory.

Dr. Honeyburne, who has recently been examining the clinical notes made at the Day Open-Air School, Crumpsall, has calculated the values of some of these indices and has made an inquiry into their usefulness. Also, he has proposed a new one having as the numerator the actual naked weight  $\times 100$  and as the denominator a "standard weight" derived from the chest girth and the sitting height. I have suggested to Dr. Honeyburne that his name should be attached to this index.

The two articles which follow are very condensed accounts of the work that he has done on some of the data recorded at the Day Open-Air School.

## " INDICES OF NUTRITION "

By W. R. Honeyburne, M.A., M.D., Ch.B., D.P.H.

In the intervals between the more extensive clinical and functional examinations made at an open-air school the results of physical measurements may be used in a formula as an index of nutrition to show whether, or not, the child is making proper progress in its physical condition.

In order to be useful, the value of the index should not change simply with the increasing age of the child, and it should not be too sensitive to the small changes, plus or minus, in the measurements which may possibly occur without clinically noticeable fluctuations in the level of nutrition ; further, for convenience, it should have a "par" value of 100.

The usefulness of the following indices has been tested on the measurements obtained from the records of 50 boys at the Day Open-Air School, Crumpsall, Manchester, taken during a stay of from six months to six years.

1. Index Ponderalis, also called Livi's Index.
2. Index Pelidisi.
3. Tuxford's Index.
4. Buoyancy Index.
5. Honeyburne's Index.

$$(1) \text{ Index Ponderalis} = \frac{1,000 \times \sqrt[3]{\text{Wt.}, \text{ in grms.}}}{\text{Ht.}, \text{ in centimetres}}$$

This has been estimated by different observers for a very large number of children. Its value should be approximately 230. It is not a good index for showing improvement in the individual child for its value slowly falls throughout elementary school life. It was lower for 80 per cent. of 50 boys at the School in 1939 than on admission.

$$(2) \text{ Index Pelidisi} = \frac{\sqrt[3]{10} \times \sqrt[3]{\text{Wt.}, \text{ in grms.}}}{\text{Sitting Ht.}, \text{ in centimetres}}$$

This index is supposed to have the value of 1.0 for normal nutrition but none of the 50 boys at the School exceeded .956 in spite of prolonged attendance. The complete range of indices extended from .844 to .956 ; one boy, during a stay of six years, varied only between .910 and .922. The index was lower in 1939 than on admission in 52 per cent. of the cases.

$$(3) \text{ Tuxford's Index} = \frac{\text{Wt.}, \text{ in grms.} \times (381 - \text{Age}, \text{ in months})}{\text{Ht.}, \text{ in centimetres} \times 54}$$

$$\text{or alternatively} = \frac{\text{Wt.}, \text{ in lbs.} \times (379 - \text{Age}, \text{ in months})}{\text{Ht.}, \text{ in inches} \times 0.3}$$

This index, because there are no cube roots, as in the two preceding formulae, is quickly calculated and the factor, which corrects for age, keeps it within satisfactory limits at school age. It is sensitive

to slight changes in weight and height and if any conditions, e.g., temporary ill-health, reduce the weight and allow the height to increase at the same time, which often happens, it is in fact too sensitive. The normal figure is 1,000. <sup>1</sup> Huws Jones, M.A., B.Sc., however, found it to be the most useful index of those he tested.

$$(4) \text{ Buoyancy Index} = \frac{\text{Wt., in grms.}}{\text{Ht., in cms.} \times (\text{Chest girth})^2}$$

This index was tried by Mumford at the Manchester Grammar School for 2,300 boys. It showed a slight fall from .058 at age 10 years to .055 at age 14 years, and it resembles Tuxford's index in its fall with increasing age. Its name would be self-descriptive if the human body were a homogeneous circular cylinder.

$$(5) \text{ Honeyburne's Index} = \frac{100 \times \text{Weight}}{\text{Standard Weight (Woolham)}}$$

The writer suggests the above as an index of nutrition. It is formed by dividing the actual naked weight of a child by the calculated weight of a volume that represents the bulk of the child, and multiplying the quotient by 100.

The weight for bulk of an elementary school child in the range of from 7 years to 13 years, inclusive, may be obtained, in kilogrammes, from the formula—

$$\text{Standard weight} = (\text{Chest girth})^2 \times \text{sitting height} \times C.*$$

This new index is more sensitive than Pelidisi to small changes in weight and sitting height: for 50 boys at the School it showed a range from 82 to 110, 100 being "par." On admission to the school 22 per cent. of the boys were above 100 but after a stay there were 40 per cent. above this par figure. There is a slight fall also with this index as boys grow older.

Thirty-six of the same fifty boys showed a gain in this index by the end of their first year at the school, ten showed a loss and four showed no change.

An analysis of the figures shows that the greatest gain in weight takes place during the first four months at the School, and that afterwards there is, on the whole, a steady increase.

A similar result was obtained for the increase in Honeyburne's Index, the mean increase for 25 boys who stayed for two years at the school being the same for the second year as for the first, namely 1.35. Again, there were 12 boys who stayed at least four years at the school. They included eight chest cases, two of these admitted with bronchiectasis and one arrested pulmonary tuberculosis; there were also one case of chronic otitis media, one of anaemia, and one who was reported to have been "frail and delicate from infancy." These

<sup>1</sup> Reference.—"Physical Indices and Clinical Assessments of the Nutrition of School Children," R. Huws Jones, M.A., B.Sc. Read before the Royal Statistical Society, November 16th, 1937.

\*Chest girth and sitting height are measured in centimetres and C. for boys and girls respectively is .000106 and .000112.

12 boys improved slowly, the mean increase in Honeyburne's Index being 1.08 in the first year and 3.15 altogether in the three subsequent years, thus showing steady progress. Even after this long period at the school the mean index was only 96.93, compared with 97.84 for the whole of the 50 boys and 102.58 for 100 healthy boys at the Styal Cottage Homes.

Various data, obtained from one boy, are set out below for comparison :—

E.S. IN ATTENDANCE AT THE DAY OPEN AIR SCHOOL, MANCHESTER							
Age	Y.m. 8-7	Y.m. 9-0	Y.m. 9-5	Y.m. 9-8	Y.m. 10-1	Y.m. 10-4	Y.m. 10-7
Naked Weight, Kilos. . .	22.45	23.17	24.32	24.32	26.14	27.50	27.95
Standard Weight, Kilos. (Woolham) . . .	23.07	23.86	24.66	25.34	25.80	26.82	27.73
Standard Weight, Kilos. (Dreyer) . . .	23.35	24.22	25.10	25.82	26.35	27.36	28.26
Index Ponderalis (230) . .	228.8	227.5	228.7	225.8	228.6	228.8	227.7
Index Pelidisi (1.0) . .	.904	.901	.902	.893	.905	.911	.904
Index Tuxford (1,000) . .	937	933	953	930	970	992	986
Index Honeyburne (100) . .	97.3	97.1	98.6	96.0	101.3	102.5	100.8

This boy was admitted because of his debility. Nothing abnormal was found in his chest and his haemoglobin percentage was normal.

#### " HAEMOGLOBIN RECORDS AT THE DAY OPEN-AIR SCHOOL "

By W. R. Honeyburne, M.A., M.D., Ch.B., D.P.H.

The records of 118 boys and 118 girls attending the Day Open-Air School were examined as regards the haemoglobin estimate. Two classifications were made :—

(a)—According to the condition of the lungs on admission to the school, those children with adventitious sounds being classified as chest cases, and those without as non-chest cases. A history of pneumonia was given in nine-tenths of all the chest cases.

(b)—According to sex.

The tables below give the results :—

PERCENTAGES OF HAEMOGLOBIN ON ADMISSION TO THE DAY OPEN AIR SCHOOL										
	30-39	40-49	50-59	60-69	70-79	80-89	90-99	100-109	Totals	
(a) Chest Cases. . .	0	2	1	3	4	22	70	36	138	
Non-Chest Cases . . .	1	1	2	2	1	12	55	24	98	
									236	
(b) Boys . . .	0	1	1	0	4	16	58	38	118	
Girls . . .	1	2	2	5	1	18	67	22	118	
	1	3	3	5	5	34	125	60	236	

(a) These figures, on analysis, do not show any significant difference between chest and non-chest cases in their haemoglobin percentages.  
 (b) A significant difference is shown by these figures between boys and girls for haemoglobin, in accordance with the well-known sex difference in the adult.

More boys than girls have a percentage of haemoglobin above 99 and more girls than boys have a percentage below 70.

## FOLLOWING UP

The methods employed by the Department in following up cases to ensure adequate treatment is provided are varied and the under-mentioned is a brief survey of those methods.

### (a) BY SCHOOL NURSES

During the year the school nurses have followed up, with a view to ascertaining if adequate treatment has been provided, 1,397 cases of disease or defect. Visits have been paid to the children's homes at intervals throughout the year and these have been supplemented in many instances by interviews with the children in the schools where the illness has not prevented the child attending.

The above figures refer to all types of cases except those classified as minor ailment, and the figures of these cases appear in Table IV, Groups I-IV, under the heading "Treated Otherwise."

The number of home visits paid by the nurses during the year was 10,388 and 7,315 cases were seen and questioned in school. These figures refer to all types of cases, excluding uncleanliness.

### (b) BY MEDICAL SUPERVISION AT THE CENTRAL CLINIC

One session of each day of the week is devoted to the examination of children suffering from more serious conditions, and the cases from this clinic provide those for the Committee's Residential Open-Air Schools. The number of cases under periodical medical supervision during the year was 2,514.

### (c) SPECIAL INTERVIEWS BY THE ACTING SCHOOL MEDICAL OFFICER

When parents refuse to provide adequate medical attention for their children and disregard warning notices and visits by the school nurses, they are summoned to attend the Central Clinic for interview by the Acting School Medical Officer. Pressure is exerted in those cases which require such a procedure and explanations are given when it appears that inaction is due to a lack of understanding. The number of cases seen during the twelve months was 178.

(d) Another method of exerting pressure on parents to fulfil their obligations is to summon them before members of the Education Committee, who hold special meetings in the evenings in order to warn parents if they are not fulfilling the law as regards the education of their children. The number of cases submitted to the Rotas for attention was 14.

### (e) PROSECUTION

No cases were submitted for prosecution during the year for failure to provide medical attention or for allowing their children to remain in a persistently verminous condition.

## PROVISION OF MEALS

The following is statistical information regarding the provision of meals and the provision of milk :—

MEALS		Cases	Children
NEW APPLICATIONS.	Granted free ..	831	1,774
	On payment ..	40	68
	Refused ..	73	144
	Total ..	<hr/> 944	<hr/> 1,986
MEALS SUPPLIED.	Free .. ..	.. ..	1,484,775
	On payment .. ..	.. ..	36,757
	Special Schools .. ..	.. ..	66,558
	Total ..	<hr/> 1,588,090	

Of the total number of meals supplied to children in attendance at the Special Schools, payment of 1d. per meal was made in 35,215 instances.

The number of individual children supplied during the year was 13,517 and the number of children on the meals' list at the end of the year was 11,869. This number can be registered as the constant figure throughout the year.\*

### Milk

The total number of bottles of milk supplied during the year was 1,681,743. The number of individual children receiving free milk during the year was 12,838.\* There is, of course, a scheme in operation whereby every child can be supplied with a daily ration of milk on payment.

## INFECTIOUS DISEASES

The visitation of schools and the examination of contacts with infectious diseases was carried out systematically until the outbreak of war. During the period the work was in progress 59 visits were paid to schools and 9,214 individual children were inspected. There was no serious outbreak of any infectious disease during the year.

The expected epidemic of Measles did not occur during the year, and this change in its incidence was considered to be due to evacuation by some authorities. However, a report from New York, U.S.A., shows that the change in incidence occurred there also.

## PHYSICAL EDUCATION

Mr. F. SMITH, the Organiser of Physical Education to the Committee, submits the following short report on the work for the year 1939.

### REPORT OF THE ORGANISER OF PHYSICAL EDUCATION FOR THE YEAR 1939

“ During the early months steady progress was being made and a keen spirit prevailed in all branches of the work. We were reaping the

\* Note : The Provision of Meals Service was suspended on the outbreak of war September 30th, 1939, and re-commenced January 15th, 1940.

The Provision of Milk was also suspended on the outbreak of war but was recommenced on November 7th, 1939, in schools open under the Tutorial Scheme.

benefits of several years of intensive Training Courses for teachers in all types of schools. Facilities were improving and much more apparatus was being supplied and the standard of work in the schools was good. Unfortunately as the year progressed preparation for evacuation and other matters interfered with the normal work. The Scheme proceeded normally until the Summer vacation, though there were curtailments of facilities that slowed down the work outside the schools including swimming and games. The closure of certain Baths together with the restrictions in the playing fields reduced the extent of these activities, though every effort was made to carry on wherever facilities were available.

“ On the re-opening of schools after the Summer vacation and the subsequent declaration of war, school work had to be regarded in relation to evacuation and all its problems. When the children were settled in the various Reception Areas arrangements were made wherever possible to ensure that the children continued their normal physical activities.

#### “ *Refresher Courses for Teachers*

“ During 1939 five Courses were arranged and 171 teachers attended. The Courses included work for all types of schools—one for women teaching in Junior Schools, and one for men teaching in Junior Schools ; two courses, one for men and one for women teachers in Senior Schools, and one for teachers in Infant Schools.

“ In this way opportunities were afforded to teachers in all grades of schools to keep up to date and refresh their outlook in the work. The scheme included practical work based on the lessons used in schools, and opportunities were provided for demonstrating and teaching these exercises. For the men, games, vaulting, and agility were emphasised, and for the women, games, vaulting, and dancing.

“ During the Courses the importance of good footwork and posture was stressed. It should be added that the Senior Courses were arranged with a view to selecting and training teachers in order to fit them to teach in gymnasia.

#### “ *Swimming and Life Saving*

“ The requisitioning of four swimming baths by the A.R.P. Authorities has had a serious effect on the extent of school swimming, attendances in certain districts being severely curtailed.

“ On the outbreak of war in September the evacuation scheme stopped all swimming in Manchester for several weeks but swimming was re-started for the children left in the city in conjunction with the Tutorial Scheme, the numbers being limited to 20 children in each baths at one time. This evoked good response wherever it was available. The limited number permitted prevented many children from taking advantage of these classes.

#### “ *Statistics (Swimming)*

“ The following tables show the number of schools from which children were sent to the baths, the number of weekly periods of

attendance by school children at the swimming and land drill classes including the Committee's Bath at the Styal Cottage Homes for the last two years.

		1939		
		Number of Schools	Number of Weekly Periods	Number of Attendances
Summer	..	178	566	147,048
Winter	..	91	377	75,030
				222,078
		1938		
Summer	..	201	614	255,003
Winter	..	114	411	233,158
				488,161

“ The Annual Swimming Tests were held in July. The number of awards gained by school children were :—

		Boys	1939	1938
25 yards	..	..	1,577	2,210
100 „	..	..	370	647
200 „	..	..	856	926
500 „	..	..	812	1,154
Medallion of Merit		..	182	277
		..	3,797	5,214
		Girls		
25 yards	..	..	901	1,607
50 „	..	..	226	369
100 „	..	..	389	614
200 „	..	..	430	721
Medallion of Merit		..	63	115
		..	2,009	3,426

“ Awards gained by children who took the Royal Life Saving Society's examinations :—

	Bars	Bronze Medallion	Intermediate Certificate	Elementary Certificate
Elementary Boys	..	11	193	397
Elementary Girls	..	—	71	127
Secondary Boys	..	26	34	38
Secondary Girls	..	—	52	47
			Total awards ..	1,674

“ Five First Class and nine Second Class Instructors' Certificates were awarded to children attending Secondary Schools.

#### “ Organised Games

“ The taking over of playing fields by the A.R.P. Authorities certainly had an effect on the Games' Scheme but in spite of many difficulties the games have been carried on in most areas. Close co-operation with the Parks' Department has made this possible.

“ The number of attendances at the Parks and Recreation Grounds for 1939 and 1938 is given below :—

	Winter, 1939	Summer, 1939	Winter, 1938	Summer, 1938
Boys ..	101,143	131,351	118,258	136,452
Girls ..	38,740	92,432	50,938	96,432
	<hr/>	<hr/>	<hr/>	<hr/>
	139,883	223,783	169,246	232,884

“ The number of Departments using pitches was :—

	1939	1938
Summer .. .. ..	163	168
Winter .. .. ..	98	103

“ The above tables indicate that the schools have taken every advantage of the facilities available.”

#### AFTER-CARE OF MENTAL DEFECTIVES

The arrangements between the Education Committee and the South-East Lancashire Association for Mental Welfare have continued during the year, and the following figures indicate the amount of work undertaken by that Association :—

		Males	Females	Total	
(1) TOTAL CASES REFERRED TO THE SOUTH-EAST LANCASHIRE ASSOCIATION FOR MENTAL WELFARE SINCE JULY, 1926, TO YEAR ENDING 1939 .. .. .. ..	1,343	1,093	2,441		
Reinstated .. ..	3	2			
(2) TOTAL CASES UNDER SUPERVISION OF SOUTH-EAST LANCASHIRE ASSOCIATION FOR MENTAL WELFARE DURING 1939, i.e. ALL UNDER 18 YEARS OF AGE .. .. .. ..	376	262	638		
(3) CASES REPORTED DURING 1939 .. .. .. ..	73	49	122		
(4) OF (2) IN REGULAR EMPLOYMENT .. .. .. ..	162	102	264		
(5) NUMBER OF VISITS PAID .. .. .. ..	646	432	1,078		
(6) NUMBER OF REPORTS MADE .. .. .. ..	410	291	701		
(7) SPECIAL INFORMATION REGARDING CASES IN GENERAL					
	Males	Females	Total		
Transferred to the L.M.D.A.C. .. .. .. ..	38	26	64		
Unable to trace .. .. .. ..	18	11	29		
Deceased .. .. .. ..	—	—	—		
Out of Area .. .. .. ..	1	1	2		
Over 18 years of age .. .. .. ..	66	42	108		
Homes and Schools .. .. .. ..	1	—	1		
	Total ..	124	80	204	

#### NURSERY SCHOOLS

The number of children in the nursery schools examined in routine prior to the outbreak of war was 168 and 36 of these children had been re-inspected. The number of children found to require treatment was 51, which equals 30.4 per cent.

Particulars of the kind of treatment given to those children requiring it will be found in the statistical tables.

When evacuation was ordered nursery school children were transferred to the building which was previously occupied by the boys and girls of the Manchester Residential Open-Air School at Styal. Reference is made to this transference under the heading of Special Schools and Evacuation.

### SECONDARY AND DAY CONTINUATION AND JUNIOR TECHNICAL SCHOOLS

The work of inspection of the students at these schools continued on normal lines until the time of evacuation. The statistical tables at the end of the report show the amount of inspection given and the amount of treatment undertaken for them at the school clinics.

### EMPLOYMENT OF CHILDREN AND YOUNG PERSONS

The number of children medically examined in connection with children falling under the above heading was 1,314. The number rejected as being unsuitable was two. Many others were found to require treatment before being granted a certificate allowing them to be employed. In all cases the necessary treatment was obtained before the probationary certificate was replaced by one giving permission to be employed unconditionally.

### MEDICAL EXAMINATION OF SCHOLARSHIP CANDIDATES, COLLEGE STUDENTS, ETC., AND OTHER MISCELLANEOUS MEDICAL EXAMINATIONS

During the year the Medical Officers of the School Medical Service have carried out examination of the following :—

(a) Student teachers, scholarship candidates .. .. .. .. ..	131
(b) Entrants to and leavers from the College of Domestic Economy .. ..	127
(c) Newly-appointed teachers .. .. .. .. ..	164
(d) Appointment of officials and other miscellaneous examinations of officials and teachers .. .. .. .. ..	193
	615

### FINANCIAL CONTRIBUTIONS TOWARDS COST OF TREATMENT

Parents' contributions towards the cost of medical and dental treatment remain on a voluntary basis. The amounts collected last year are as follows :—

	£	s.	d.
Minor Ailments Clinics .. .. .. .. ..	198	18	10
Operative Treatment for Adenoids and Enlarged Tonsils ..	32	14	0
Provision of Spectacles under the Committee's Scheme ..	42	1	6
Payment for Treatment at the Day Open-Air School ..	164	9	6
Payment for Treatment at the Residential Schools .. ..	1,153	14	5
Payment for Treatment by Manchester Corporation Public Health Committee .. .. .. .. ..	217	0	0
Payment for Treatment by Local Authorities .. ..	3	6	0
Transfer in respect of Treatment of Cases from Mobberley Approved School .. .. .. .. ..	5	10	0
	£1,817	14	3

# SUMMARY OF WORK DONE (ELEMENTARY SCHOOLS)

The following is a summary of the chief items of work done during the year 1939 :—

## STATISTICAL TABLES

The statistical tables prepared in the manner suggested in Form 6M are given in the following pages.

TABLE I  
MEDICAL INSPECTIONS OF CHILDREN ATTENDING PUBLIC  
ELEMENTARY SCHOOLS

#### A—ROUTINE MEDICAL INSPECTIONS

Number of Inspections in the prescribed Groups								
Entrants	..	..	..	..	..	..	..	7,293
Second Age Group	..	..	..	..	..	..	..	5,715
Third Age Group	..	..	..	..	..	..	..	4,551
							Total	17,559
Number of other Routine Inspections	..	..	..	..	..	..		3,032
							Grand Total	20,591

## B—OTHER INSPECTIONS

Number of Special Inspections and Re-inspections .. .. .. 129,493

TABLE II  
(Formerly part of Form 8 b. M.)

## CLASSIFICATION OF THE NUTRITION OF CHILDREN INSPECTED DURING THE YEAR IN THE ROUTINE AGE GROUPS UP TO AUGUST 31st, 1939

Age-groups	Number of Children Inspected	A. (Excellent)		B. (Normal)		C. (Slightly subnormal)		D. (Bad)	
		No.	%	No.	%	No.	%	No.	%
Entrants ..	7,293	1,317	18.06	5,405	74.11	566	7.76	5	.07
Second Age-group	5,715	901	15.77	4,224	73.91	588	10.29	2	.03
Third Age-group..	4,551	929	20.41	3,220	70.75	397	8.72	5	.11
Other Routine Inspections ..	3,032	598	19.72	2,244	74.01	189	6.23	1	.03
Total ..	20,591	3,745	18.19	15,093	73.3	1,740	8.45	13	.06

# ELEMENTARY SCHOOLS

## TABLE IV

GROUP I—MINOR AILMENTS (excluding Uncleanliness, for which see Table VI)

DISEASE OR DEFECT (1)	Number of Defects treated, or under treatment during the year			Total (4)
	Under the Authority's Scheme (2)	Otherwise (3)		
<i>Skin—</i>				
Ringworm—Scalp :				
(i) X-ray Treatment .. .. ..	4	—	—	4
(ii) Other Treatment .. .. ..	1	—	—	1
Ringworm—Body .. .. ..	59	2	—	61
Scabies .. .. ..	838	20	—	858
Impetigo .. .. ..	2,436	45	—	2,481
Other Skin Disease .. .. ..	3,628	143	—	3,771
<i>Minor Eye Defects—</i>				
(External and other, but excluding cases falling in Group II) .. .. ..	2,821	101	—	2,922
Minor Ear Defects— .. .. ..	3,688	188	—	3,876
<i>Miscellaneous—</i>				
(e.g., minor injuries, bruises, sores, chil-blains, etc.) .. .. ..	16,414	386	—	16,800
Total ..	<u>29,889</u>	<u>885</u>	—	<u>30,774</u>

GROUP II—DEFECTIVE VISION AND SQUINT (excluding Minor Eye Defects treated as Minor Ailments—Group I)

DISEASE OR DEFECT	Number of Defects dealt with			Total
	Under the Authority's Scheme	Otherwise		
Errors of Refraction (including Squint) ..	8,179	207	—	8,386
Other Defect or Disease of the Eyes (excluding those recorded in Group I) .. ..	—	—	—	—
Total ..	<u>8,179</u>	<u>207</u>	—	<u>8,386</u>
 <i>Number of Children for whom spectacles were</i>				
(a) Prescribed .. .. ..	3,236	106	—	3,342
(b) Obtained .. .. ..	2,905	99	—	3,004

### GROUP III—TREATMENT OF DEFECTS OF NOSE AND THROAT

Under the Authority's Scheme in Clinic or Hospital	NUMBER OF DEFECTS												Received other forms of treatment	Total number treated		
	Received Operative Treatment						Total									
	By Private Practitioner or Hospital, apart from the Authority's Scheme															
(i)	(1)	(ii)	(iii)	(iv)	(i)	(ii)	(2)	(iii)	(iv)	(i)	(ii)	(3)	(iiii)	(iv)	(4)	(5)
3	10	328	7	30	3	98	12	33	13	426	19	3,258		3,749		
	(i) Tonsils only.						(iii) Tonsils and Adenoids.									
	(ii) Adenoids only.						(iv) Other defects of the Nose and Throat.									

### GROUP IV—ORTHOPAEDIC AND POSTURAL DEFECTS

Postural defects which received non-residential treatment otherwise than at an orthopaedic clinic are not recorded in this table.

A child may be recorded in more than one category and therefore the total number of children treated will not necessarily be the same as the sum of the figures in the separate categories.

Number of children treated ..	Under the Authority's Scheme			Otherwise			Non-residential treatment at an orthopaedic clinic (iii)	Total number treated
	Residential treatment with education (i)	Residential treatment without education (ii)	Non-residential treatment at an orthopaedic clinic (iii)	Residential treatment with education (i)	Residential treatment without education (ii)			
111	—	—	1,250	—	—	—	57	1,418

TABLE V  
DENTAL INSPECTION AND TREATMENT

The heading "Specials" in this Table relates to all children inspected by the School Dentist otherwise than in the course of the routine inspection of children in one of the age groups covered by the Authority's approved scheme, namely, to children specially selected by him, or referred by Medical Officers, Parents, Teachers, etc., on account of urgency. The number inspected in each routine age-group is separately shown, as well as the total, but under "Specials" only the total number is given.

Temporary fillings, whether in permanent or temporary teeth, are recorded as other operations.

#### (1) Number of children inspected by the Dentist—

##### (a) Routine Age-groups

Age ..	5 and under	6	7	8	9	10	11	12	13	14	Total
Number	4,001	2,839	2,924	3,378	3,540	3,399	3,266	2,717	2,740	808	29,612

(b) Specials (see note above) .. .. .. .. .. .. 6,086

(c) TOTAL (Routine and Specials) .. .. .. .. .. .. 35,698

(2) Number found to require treatment .. .. .. .. .. .. 27,956

(3) Number actually treated .. .. .. .. .. .. 20,067

(4) Attendances made by children for treatment .. .. .. .. .. .. 32,702

(5) Half-days devoted to—

Inspection .. .. .. .. .. .. 259

Treatment .. .. .. .. .. .. 3,363 Total .. 3,622

(6) Fillings (see note above)—

Permanent Teeth .. .. .. .. .. .. 9,007

Temporary Teeth .. .. .. .. .. .. 210 Total .. 9,217

(7) Extractions—							
Permanent Teeth ..	..	..	..	..	10,766		
Temporary Teeth ..	..	..	..	..	31,049	Total ..	41,815
(8) Administrations of general anaesthetics for extractions						..	5,734
(9) Other Operations—							
Permanent Teeth ..	..	..	..	..	2,268		
Temporary Teeth ..	..	..	..	..	165	Total ..	2,433

TABLE VI

UNCLEANLINESS AND VERMINOUS CONDITIONS

A statement as to the arrangements made by the Local Education Authority for cleansing verminous children and a record of the cases in which legal proceedings were taken, should be included in the body of the School Medical Officer's Report.

All cases of uncleanness, however slight, should be recorded.

The Return should relate to individual children and not to instances of uncleanness.

(i) Average number of visits per school made during the year by the School Nurses ..	..	..	..	..	..	10
(ii) Total number of examinations of children in the Schools by School Nurses ..	..	..	..	..	..	161,924
(iii) Number of individual children found unclean (see note above) ..						8,799
(iv) Number of individual children cleansed under Section 87 (2) and (3) of the Education Act, 1921 ..	..	..	..	..	..	3
(v) Number of cases in which legal proceedings were taken—						—
(a) Under the Education Act, 1921 ..	..	..	..	..	..	—
(b) Under School Attendance Byelaws ..	..	..	..	..	..	—

SECONDARY SCHOOLS

TABLE IV

TREATMENT TABLES

Examined according to schedule ..	..	..	..	..	712
Number of these found to require treatment ..	..	..	..	..	176
Re-inspections ..	..	..	..	..	418

GROUP I—MINOR AILMENTS (excluding Uncleanness, for which see Table VI)

DISEASE OR DEFECT	Number of Defects treated, or under treatment during the year		
	Under the Authority's Scheme	Otherwise	Total
<i>Skin—</i>			
Ringworm—Scalp :			
(i) X-ray Treatment. ..	..	..	—
(ii) Other ..	..	..	—
Ringworm—Body ..	..	..	1
Scabies ..	..	..	—
Impetigo ..	..	..	10
Other Skin Disease ..	..	..	25
<i>Minor Eye Defects—</i>			
(External and other, but excluding cases falling in Group II) ..	..	..	19
<i>Minor Ear Defects—</i>			
..	..	..	20
<i>Miscellaneous—</i>			
(e.g., minor injuries, bruises, sores, chilblains, etc.) ..	..	..	105
		14	119
Total ..	..	180	16
			196

GROUP II—DEFECTIVE VISION AND SQUINT (excluding Minor Eye Defects treated as Minor Ailments—Group I)

DISEASE OR DEFECT	Number of Defects dealt with			
	Under the Authority's Scheme	Otherwise	Total	
Errors of Refraction (including Squint) ..	401	17	418	
Other Defect or Disease of the Eyes (excluding those recorded in Group I) ..	—	—	—	
<i>Total</i> ..	<u>401</u>	<u>17</u>	<u>418</u>	
Number of children for whom spectacles were				
(a) Prescribed .. .. .. ..	200	12	212	
(b) Obtained .. .. .. ..	165	12	177	

GROUP III—TREATMENT OF DEFECTS OF NOSE AND THROAT

NUMBER OF DEFECTS									
Under the Authority's Scheme in Clinic or Hospital	Received Operative Treatment				Total	Received other forms of treatment	Total number treated		
	(1)	(2)	(3)	(4)					
(i) (ii) (iii) (iv)	(i) (ii) (iii) (iv)	(i) (ii) (iii) (iv)	(i) (ii) (iii) (iv)	(i) (ii) (iii) (iv)	—	—	—	—	36
(i) Tonsils only.		(iii) Tonsils and Adenoids.							
(ii) Adenoids only.		(iv) Other defects of the Nose and Throat.							

GROUP IV—ORTHOPAEDIC AND POSTURAL DEFECTS

Postural defects which received non-residential treatment otherwise than at an orthopaedic clinic are not recorded in this table.

A child may be recorded in more than one category and therefore the total number of children treated will not necessarily be the same as the sum of the figures in the separate categories.

Number of children treated ..	Under the Authority's Scheme (1)				Otherwise (2)				Total number treated (see note above)
	Residential treatment with education	Residential treatment without education	Non-residential treatment at an orthopaedic clinic	Residential treatment with education	Residential treatment without education	Non-residential treatment at an orthopaedic clinic			
—	—	—	66	—	—	—	3	3	69

TABLE V  
DENTAL INSPECTION AND TREATMENT

The heading "Specials" in this Table relates to all children inspected by the School Dentist otherwise than in the course of the routine inspection of children in one of the age groups covered by the Authority's approved scheme, namely, to children specially selected by him, or referred by Medical Officers, Parents, Teachers, etc., on account of urgency. The number inspected in each routine age-group is separately shown, as well as the total, but under "Specials" only the total number is given. Temporary fillings, whether in permanent or temporary teeth, are recorded as other operations.

(1) Number of children inspected by the Dentist—													
TOTAL inspected	..	..	..	..	..	..	..	..	..	..	..	..	94
(2) Number found to require treatment	..	..	..	..	..	..	..	..	..	..	..	..	94
(3) Number actually treated	..	..	..	..	..	..	..	..	..	..	..	..	94
(4) Attendances made by children for treatment	..	..	..	..	..	..	..	..	..	..	..	..	159
(5) Half-days devoted to—													
Inspection : Cannot make accurate apportionment													
Treatment : Included in Table for Elementary Schools.													
(6) Fillings (see note above)—													
Permanent Teeth	..	..	..	..	..	..	41						
Temporary Teeth	..	..	..	..	..	..	—	Total	..	..	..	..	41
(7) Extractions—													
Permanent Teeth	..	..	..	..	..	..	77						
Temporary Teeth	..	..	..	..	..	..	18	Total	..	..	..	..	95
(8) Administrations of general anaesthetics for extractions	..	..	..	..	..	..							10
(9) Other Operations—													
Permanent Teeth	..	..	..	..	..	..	32						
Temporary Teeth	..	..	..	..	..	..	—	Total	..	..	..	..	32

## DAY CONTINUATION AND JUNIOR TECHNICAL SCHOOLS

Examined according to Schedule .. .. .. ..	821
Number of these found to require treatment .. ..	129
Re-inspections .. .. .. .. .. .. ..	9

## TABLE IV

### TREATMENT TABLES

GROUP I—MINOR AILMENTS (excluding Uncleanliness, for which see Table VI).

DISEASE OR DEFECT (1)	Number of Defects treated, or under treatment during the year		
	Under the Authority's Scheme (2)	Otherwise (3)	Total (4)
Skin—			
Ringworm—Scalp			
(i) X-ray Treatment.	..	..	—
(ii) Other	,,	..	—

DISEASE OR DEFECT	Number of Defects treated, or under treatment during the year			
	Under the Authority's Scheme	Otherwise	Total	
(1)	(2)	(3)	(4)	
Ringworm—Body	..	..	..	—
Scabies	..	..	..	1
Impetigo	..	..	..	—
Other Skin Disease	..	..	..	8
			12	20
Minor Eye Defects—				
(External and other, but excluding cases falling in Group II)	..	..	..	9
			4	13
Minor Ear Defects—	..	..	..	11
			8	19
Miscellaneous—				
(e.g., minor injuries, bruises, sores, chil-blains, etc.)	..	..	..	45
			3	48
Total	..	..	74	27
				101

GROUP II—DEFECTIVE VISION AND SQUINT (excluding Minor Eye Defects treated as Minor Ailments—Group I)

DISEASE OR DEFECT	Number of Defects dealt with		
	Under the Authority's Scheme	Otherwise	Total
Errors of Refraction (including Squint) ..	40	14	54
Other defect or Disease of the Eyes (excluding those recorded in Group I) ..	—	—	—
<i>Total</i> .. ..	40	14	54
Number of children for whom spectacles were			
(a) Prescribed .. .. .. .. ..	14	3	17
(b) Obtained .. .. .. .. ..	13	2	15

### GROUP III—TREATMENT OF DEFECTS OF NOSE AND THROAT

NUMBER OF DEFECTS

Under the Authority's Scheme in Clinic or Hospital	Received Operative Treatment				Total	Received other forms of treatment	Total number treated				
	By Private Practitioner or Hospital, apart from the Authority's Scheme										
(i)	(ii)	(1)	(iii)	(iv)	(i)	(ii)	(3)	(iii)	(iv)	(4)	(5)
—	—	—	—	—	—	—	—	—	—	—	21
(i) Tonsils only.					(iii) Tonsils and Adenoids.						21
(ii) Adenoids only.					(iv) Other defects of the Nose and Throat.						

(i) Tonsils only

(ii) Adenoids only.

### (iii) Tonsils and Adenoids.

- (iv) Other defects of the Nose and Throat.

#### GROUP IV—ORTHOPAEDIC AND POSTURAL DEFECTS

Postural defects which received non-residential treatment otherwise than at an orthopaedic clinic are not recorded in this table.

A child may be recorded in more than one category and therefore the total number of children treated will not necessarily be the same as the sum of the figures in the separate categories.

Under the Authority's Scheme (1)			Otherwise (2)			Total number treated (see note above)
Residential treatment with education	Residential treatment without education	Non-residential treatment at an orthopaedic clinic	Residential treatment with education	Residential treatment without education	Non-residential treatment at an orthopaedic clinic	
(i)	(ii)	(iii)	(i)	(ii)	(iii)	
Number of treated ..	—	—	24	—	—	24

#### NURSERY SCHOOLS

Number examined ..	..	..	..	..	..	168
Number of these requiring treatment ..	..	..	..	..	..	51
Re-inspections ..	..	..	..	..	..	36

TABLE IV

#### TREATMENT TABLES

#### GROUP I—MINOR AILMENTS (excluding Uncleanliness, for which see Table VI)

DISEASE OR DEFECT (1)	Number of Defects treated, or under treatment during the year			Total (4)
	Under the Authority's Scheme (2)		Otherwise (3)	
<i>Skin—</i>				
Ringworm—Scalp :				
(i) X-ray Treatment .. .. .. — — —				
(ii) Other Treatment .. .. .. — — —				
Ringworm—Body .. .. .. — — —				
Scabies .. .. .. — — —				
Impetigo .. .. .. 7 — 7				
Other Skin Disease .. .. .. 10 — 10				
<i>Minor Eye Defects—</i>				
(External and other, but excluding cases falling in Group II) .. .. .. 6 — 6				
<i>Minor Ear Defects—</i>				
.. .. .. 9 — 9				
<i>Miscellaneous—</i>				
(e.g., minor injuries, bruises, sores, chil-blains, etc.) .. .. .. 20 — 20				
Total .. .. 52 — 52				

GROUP II—DEFECTIVE VISION AND SQUINT (excluding Minor Eye Defects treated as Minor Ailments—Group I)

DISEASE OR DEFECT	Number of Defects dealt with		
	Under the Authority's Scheme	Otherwise	Total
Errors of Refraction (including Squint) ..	6	—	6
Other defect or Disease of the Eyes (excluding those recorded in Group I) .. ..	—	—	—
<i>Total</i> .. ..	6	—	6
Number of Children for whom spectacles were			
(a) Prescribed .. .. .. .. ..	2	—	2
(b) Obtained .. .. .. .. ..	2	—	2

### GROUP III—TREATMENT OF DEFECTS OF NOSE AND THROAT

NUMBER OF DEFECTS

Received Operative Treatment				By Private Practitioner or Hospital, apart from the Authority's Scheme				Total				Received other forms of treatment		Total number treated
Under the Authority's Scheme in Clinic or Hospital														
(i)	(ii)	(iii)	(iv)	(i)	(ii)	(iii)	(iv)	(i)	(ii)	(iii)	(iv)	(4)	(5)	
—	—	—	—	—	—	—	—	—	—	—	—	6	6	

TABLE V

## DENTAL INSPECTION AND TREATMENT

The heading "Specials" in this table relates to all children inspected by the School Dentist otherwise than in the course of the routine inspection of children in one of the age groups covered by the Authority's approved scheme, namely, to children specially selected by him, or referred by Medical Officers, Parents, Teachers, etc., on account of urgency. The numbers inspected in each routine age-group are separately shown, as well as the total, but under "Specials" only the total number is given.

Temporary fillings, whether in permanent or temporary teeth, are recorded as other operations.

(1) Number of children inspected by the Dentist—													
(a) Routine Age-groups													
(b) TOTAL inspected	..	..	..	..	..	..	..	..	..	..	..	..	87
(2) Number found to require treatment	..	..	..	..	..	..	..	..	..	..	..	..	42
(3) Number actually treated	..	..	..	..	..	..	..	..	..	..	..	..	32
(4) Attendances made by children for treatment	..	..	..	..	..	..	..	..	..	..	..	..	36
(5) Half-days devoted to—													
Inspection : Cannot make accurate apportionment													
Treatment : Included in table for Elementary Schools													
(6) Fillings (see note above)—													
Permanent Teeth	..	..	..	..	..	..	—						
Temporary Teeth	..	..	..	..	..	..	1	Total	..				1
(7) Extractions—													
Permanent Teeth	..	..	..	..	..	..	—						
Temporary Teeth	..	..	..	..	..	..	66	Total	..				66
(8) Administrations of general anaesthetics for extractions								..	..	..			10
(9) Other Operations—													
Permanent Teeth	..	..	..	..	..	..	—						
Temporary Teeth	..	..	..	..	..	..	1	Total	..				1

TABLE VI

## UNCLEANLINESS AND VERMINOUS CONDITIONS

## DAY SPECIAL SCHOOLS

TABLE IV

## TREATMENT TABLES

Number examined .. .. .. .. .. .. ..	824
Number of these found to require treatment .. .. ..	195
Re-inspections .. .. .. .. .. .. ..	511

## GROUP I—MINOR AILMENTS (excluding Uncleanliness, for which see Table VI)

DISEASE OR DEFECT (1)	Number of Defects treated, or under treatment during the year			Total (4)
	Under the Authority's Scheme (2)	Otherwise (3)		
Skin—				
Ringworm—Scalp :				
(i) X-ray Treatment. . . . .	—	—	—	—
(ii) Other Treatment . . . . .	—	—	—	—
Ringworm—Body . . . . .	2	—	—	2
Scabies . . . . .	15	—	—	15
Impetigo . . . . .	49	—	—	49
Other Skin Disease . . . . .	30	—	—	30
Minor Eye Defects—				
(External and other, but excluding cases falling in Group II) . . . . .	52	—	—	52
Minor Ear Defects— . . . . .	42	—	—	42
Miscellaneous—				
(e.g., minor injuries, bruises, sores, chil-blains, etc.) . . . . .	271	2	—	273
Total . . . . .	461	2	—	463

GROUP II—DEFECTIVE VISION AND SQUINT (excluding Minor Eye Defects  
treated as Minor Ailments—Group I)

DISEASE OR DEFECT	Number of Defects dealt with		
	Under the Authority's Scheme	Otherwise	Total
Errors of Refraction (including Squint) ..	96	1	97
Other defect or Disease of the Eyes (excluding those recorded in Group I) ..	—	—	—
<i>Total</i> .. ..	<i>96</i>	<i>1</i>	<i>97</i>
Number of Children for whom spectacles were			
(a) Prescribed .. .. .. .. ..	47	—	47
(b) Obtained .. .. .. .. ..	45	—	45

### GROUP III—TREATMENT OF DEFECTS OF NOSE AND THROAT

NUMBER OF DEFECTS
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
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20
21
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78
79
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81
82
83
84
85
86
87
88
89
90
91
92
93
94
95
96
97
98
99
100

Under the Authority's Scheme in Clinic or Hospital	Received Operative Treatment				Total	Received other forms of treatment	Total number treated		
	By Private Practitioner or Hospital, apart from the Authority's Scheme								
(i)	(ii)	(iii)	(iv)	(i)	(ii)	(iii)	(iv)	(4)	(5)
—	—	—	—	—	—	—	—	49	49
(i) Tonsils only.				(iii) Tonsils and Adenoids.					
(ii) Adenoids only.				(iv) Other defects of the Nose and Throat.					

TABLE V  
DENTAL INSPECTION AND TREATMENT

Note.—Temporary fillings, whether in permanent or temporary teeth, are recorded as other operations.







